

5 A METHOD FOR PRODUCING HIGH-SURFACE AREA
 TEXTURING OF A SUBSTRATE,
 SUBSTRATES PREPARED THEREBY AND
 MASKS FOR USE THEREIN

10 ABSTRACT OF THE DISCLOSURE

15 A method is provided for preparing high-surface area texturing of a substrate
 using methods by which material from a substrate is subtracted from or added to the
 surface of the substrate. In one embodiment, the method is a subtractive lithographic
 method that involves exposing a laser-ablatable substrate, such as a polymeric or
 ceramic substrate, to laser light. A mask may be used to define the pattern of light
 incident on the substrate. High-surface area textured substrates, in particular,
 miniaturized planar analysis devices having high-surface area textured features,
20 prepared by the methods disclosed herein are also provided. A method by which the
 high-surface area textured substrate or the miniaturized planar analysis device is used as
 a master from which replicate copies thereof may be made is also provided.